



**UNITED STATES DEPARTMENT OF COMMERCE
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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR
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08/21/99 SMITH

MM92/0104

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R	88405.99R077
EXAMINER	

NGARTENTH	PAPER NUMBER
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DATE MAILED:

01/04/01

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner of Patents and Trademarks

Office Action Summary

Application No.

09/422,398

Applicant(s)

Smith

Examiner

Nguyen, Hung Henry

Group Art Unit

2851

☒ Responsive to communication(s) filed on response filed November 22, 2000

☐ This action is **FINAL**.

☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

A shortened statutory period for response to this action is set to expire three month(s), or thirty days, whichever is longer, from the mailing date of this communication. Failure to respond within the period for response will cause the application to become abandoned. (35 U.S.C. § 133). Extensions of time may be obtained under the provisions of 37 CFR 1.136(a).

Disposition of Claims

☒ Claim(s) 1-56

Of the above, claim(s) 1-21 and 35-54 is/are pending in the application.

☐ Claim(s) _____ is/are withdrawn from consideration.

☒ Claim(s) 22-24, 29-34, 55, and 56 is/are allowed.

☒ Claim(s) 25-28 is/are rejected.

☒ Claims 1-56 is/are objected to.

_____ are subject to restriction or election requirement.

Application Papers

☐ See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.

☐ The drawing(s) filed on _____ is/are objected to by the Examiner.

☐ The proposed drawing correction, filed on _____ is ☐ approved ☐ disapproved.

☐ The specification is objected to by the Examiner.

☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).

☐ All ☐ Some* ☐ None of the CERTIFIED copies of the priority documents have been

☐ received.

☐ received in Application No. (Series Code/Serial Number) _____

☐ received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

*Certified copies not received: _____

☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

☐ Notice of References Cited, PTO-892

☒ Information Disclosure Statement(s), PTO-1449, Paper No(s). 2

☐ Interview Summary, PTO-413

☐ Notice of Draftsperson's Patent Drawing Review, PTO-948

☐ Notice of Informal Patent Application, PTO-152

--- SEE OFFICE ACTION ON THE FOLLOWING PAGES ---

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DETAILED ACTION

Election/Restriction

1. Applicant's election without traverse of group II (claims 22-34 and 55-56) in Paper No. 5 is acknowledged.

Abstract

2. The abstract of the disclosure is objected to because it is merely a recitation of a masking aperture. The applicant should amend it to reflect the method of controlling the on axis and off axis illumination as claimed. Correction is required. See MPEP § 608.01(b).

Drawings

3. The drawings are objected to under 37 CFR 1.83(a) because they fail to show details that are essential for a proper understanding of the disclosed invention should be shown in the drawing. MPEP § 608.02(d). For example, in fig.4 and 7, it is not clearly understood, what does the vertical axis or horizontal axis stand for ?. Correction is required.
4. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they include the following ~~reference sign(s)~~ not mentioned in the description: (see fig.20). Correction is required.

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Claim Rejections - 35 U.S.C. § 112

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claims 23-34 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The following terms lack proper antecedent basis in the following claims:

"said half -tone dithered image" claim 23, line 1

"the same size" claim 23, line 2.

"the relative intensity" claim 26 line 1.

As to claim 26 and 27, it is not clearly understood what the notation of D8 and Uⁿ stand for. Please clarify.

As to claim 28, the recitation of "forming two or more zones" is ambiguous and indefinite.

Claim Rejections - 35 U.S.C. § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

~~A person shall be entitled to a patent unless~~

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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8. Claims 22-24, 29-34 and 55-56 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Ogawa (U.S.Pat. 5,627,625).

As to claims 22-24, 29-34 and 55-56, Ogawa discloses a pattern projecting method comprising all of the limitations of the instant claims (see fig.2, 4AB, col.1, lines 59-65; col.2, lines 3-4, 50-56; col.6, lines 54-57).

9. Claims 22-24, 29-34 and 55-56 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Taniguchi et al (U.S.Pat. 5,677,757).

With regard to claims 22-24, 28-34 and 55-56, Taniguchi discloses an projection exposure apparatus/method comprising all of the basic features of the instant claims (see fig.1 and 2).

Allowable Subject Matter

10. Claims 25-28 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

Prior Art Made of Record

11. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.


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Yasuzato (U.S.Pat. 6,004,699), Uematsu (U.S.Pat. 5,982,476) and Inoue et al (U.S.Pat. 5,621,498) discloses an exposure apparatus/method comprising substantially all of the limitations of the claims as cited in the instant application.

12. Any inquiry concerning this application or earlier communications from the examiner should be directed to Henry Nguyen whose telephone number is (703) 305-6462.

Any inquiry of a general nature or relating the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0956.

hvn 12/26/2000


Russell Adams
Primary Examiner